

NMFS/NOAA Coastal and Marine Habitat Restoration Program
Restoring Critical Ecosystem Function to the Eel River Delta

DATA SHARING PLAN

The Project, *Restoring Critical Ecosystem Function to the Eel River Delta* (award #: NA16NMF4630011) is part of a larger restoration project known as Salt River Ecosystem Restoration Project, implemented by the Humboldt County Resource Conservation District. Implementation of the Project will provide environmental information that includes pre- and post- restoration measurements of project effectiveness, including: water quality parameters; assessments of instream salmonid habitat and fish passage; mapping of wetland and riparian vegetation species; fish presence, absence, and abundance data of salmonids, in addition to geomorphic profiles of restored river channel. Pre-restoration data sets have been collected. Post-restoration measurements and assessments will be collected annually until fall of 2018.

Specifically, data will be collected in the following manner:

- Water Quality Parameters – Dissolved Oxygen, salinity, and temperature will be collected at discrete sites during Winter Salmonid Sampling and Summer Juvenile Sampling. Spot data will be collected within the project footprint by a fisheries consultant using an Oakton and YSI hand held water quality meter. Pre-Construction water quality sampling has been collected in the Salt River below and above the project site. Water quality data will be recorded on field forms and transferred into electronic spreadsheets for storage and analysis.
- Instream Habitat and Fish Passage Assessments – Assessments will be performed by the Humboldt County Resource Conservation Staff or by California Conservation Corps/Watershed Stewards members. The habitat inventory and fish passage assessments will follow the methodology presented in the *California Salmonid Stream Habitat Restoration Manual* (Flosi et al, 1998). The assessments will be performed annually during the summer low flow months post construction. Data will be recorded on field forms and transferred into electronic spreadsheets for storage and analysis.
- Wetland and Riparian Vegetation Percent Cover and Mapping – Mapping of vegetation species in the project footprint will be performed by consultants versed in habitat mapping. Habitat acreage will be determined by a combination of aerial photointerpretation and ground-truthing. Percent coverage will use plot-based sampling methods. Methods follow the *Habitat Monitoring and Mitigation Plan* (2012) developed

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for the Salt River Ecosystem Restoration Project. The assessments will be performed annually, post construction, in the summer. Data will be collected on computer tablets or field forms and transferred into electronic spreadsheets for storage and analysis.

- Winter Salmonid Sampling – Current sampling includes 12 sites across 330 acres of restored estuary and mainstem Salt River channel (an additional site will be added near the confluence of Francis Creek and Salt River after construction activities). Low tide sampling consists of running a 30’ seine net approximately along 100’ to 150’ of channel length. Sampling crews collect, identify, and enumerate caught fish. Lengths of all captured salmonids are measured. All fish are released after processing. Water quality parameters are also measured (Dissolved oxygen, temperature, and salinity). High tide sampling sample 9 of the 12 sites, as sampling equipment cannot be deployed at 3 sites. Sampling consists of deploying a 100’ seine net from a kayak in an arc configuration and then hauled to the bank. As with the low tide sampling, crews collect, identify, and enumerate fish caught, then release. Lengths of all captured salmonids are measured. Water quality parameters are also taken. The described methods are consistent with *CDFW’s California Salmonid Stream Habitat Restoration Manual Fish Sampling Methods* (2010). Pre-construction sampling has occurred and one year of sampling will take place post construction. Data will be collected on field forms and transferred into electronic spreadsheets for storage and analysis.
- Summer Juvenile Salmonid Sampling - Sampling reaches will be established along Francis Creek and methods will include seining or electrofishing established creek reaches depending on water quality parameters. Crews will collect, identify, and enumerate fish caught, then release. Lengths of all captured salmonids will be measured. Water quality parameters will also be taken. The described methods are consistent with *CDFW’s California Salmonid Stream Habitat Restoration Manual Fish Sampling Methods* (2010). Data will be collected on field forms and transferred into electronic spreadsheets for storage and analysis.
- Geomorphic Profiles of the Restored Habitat - Two cross-sectional surveys (one in Francis Creek and one in the Salt River Channel) will to determine changes in channel geomorphology. The end points of all cross-sections shall be monumented pursuant to standard methods in order to replicate surveys during future surveys. All survey elevations shall be reported in the NAVD88 vertical datum. Data will be collected on field forms and transferred into electronic spreadsheets for storage and analysis.

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The above collected data, method details, and associated annual reports will be available to the public upon request beginning January 2019. Contact Doreen Hansen at dhhcrd@gmail.com or hcrd@yahoo.com for more information or to make a data request. In the past, the Humboldt County Resource Conservation District has been responsible for required project end reports and made data available through annual reports to project partners.